MULTIMEDIA UNIVERSITY

STUDENT IDENTIFICATION NO

MULTIMEDIA UNIVERSITY

FINAL EXAMINATION

TRIMESTER 1, 2018/2019

BIC1014 – INFORMATION SYSTEMS CONCEPTS

(All sections / Groups)

19 OCTOBER 2018
9.00 a.m – 11.00 a.m
(2 Hours)

INSTRUCTIONS TO STUDENT

1. This Question paper consists of 6 pages with 2 sections.

2. Attempt **ALL** questions in section A and section B. The distribution of the marks for each question is given.

3. Please write all your answers for questions in section A in OMR sheet provided. Answer all your answers for questions in section B in the Answer Booklet provided.

Section A: Multiple Choice Questions (20 marks)

1. Below are the unique features of e-commerce, **EXCEPT** for:
   A. Ubiquity
   B. Global reach
   C. Interactivity
   D. Information scarcity

2. Google's main revenue model is _____ .
   A. Advertising
   B. Sales
   C. Subscription
   D. Free/Freemium

3. In _____, online browsing habits of individuals on thousands of Web sites are tracked to select which advertisements to display to each individual.
   A. Long tail marketing
   B. Short tail marketing
   C. Behavioral targeting
   D. search engine marketing

4. _____ e-commerce is the selling products or services between businesses through the Internet via an online sales portal.
   A. Business-to-consumer (B2C)
   B. Business-to-business (B2B)
   C. Business-to-government (B2G)
   D. Consumer-to-consumer (C2C)

5. _____is the process of creating unique personalized Web pages that display content or adverts for products or services of special interest to individual user, thus improving the customer experience and creating additional value.
   A. Website visitor tracking
   B. Website personalization
   C. Web crowdsourcing
   D. Web advertising

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6. Which of the following is **NOT** true about Electronic Data Interchange (EDI)?
   A. Computer-to-computer exchange of business documents in a standard electronic format between business partners.
   B. By moving from a paper-based exchange of business document to EDI, businesses enjoy major benefits such as reduced cost and increased processing speed.
   C. The electronic transmission of structured data by agreed message standards from one computer system to another without human intervention.
   D. Consume significant resources, e.g. administrative costs for each procurement purchase.

7. _____ links a firm to its suppliers, distributors, and other key business partners for efficient supply chain management and other collaborative commerce activities.
   A. Private industrial network
   B. Net marketplace
   C. Social network
   D. advertising network

8. Below are Business-to-Business (B2B) platforms, **EXCEPT** for:
   A. Grainger.com
   B. Amazonbusiness.in
   C. Alibaba.com
   D. eBay.com

9. One of the impact of digital markets is the increased of price discrimination. Which of the following defines *price discrimination*?
   A. The cost of participating in a digital market.
   B. Merchants' costs of changing prices.
   C. Selling the same goods, or nearly the same goods, to different targeted groups at different prices
   D. The varying of products' prices, depending on the demand characteristics of the customer or the supply situation of the seller.

10. Below are examples of mobile commerce services, **EXCEPT** for:
    A. Mobile banking
    B. Mobile display advertising
    C. Coupon services
    D. Prediction markets

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11. For _____ decisions, decision makers need to apply judgment to solve problems during decision making process.
    A. unstructured
    B. structured
    C. operational
    D. tactical

12. Business analytics that uses location data from mobile phones, sensors, and maps are known as _____ analytics.
    A. location
    B. predictive
    C. big data
    D. operational

13. _____ analytics generates data needed for analysis from multiple sources, such as social media, consumer transactions, sensor, and machine output.
    A. Location
    B. Predictive
    C. Big Data
    D. Operational

14. The _____ is a system of interrelated computing devices, mechanical and digital machines, objects, or people with the ability to transfer data over a network without requiring human-to-human or human-to-computer interaction.
    A. Augmented Reality
    B. Virtual Reality
    C. Internet of Things
    D. Investment Workstations

15. The following are the analyses that Decision Support Systems (DSS) can do, **EXCEPT** for:
    A. What-if analysis
    B. Sensitivity analysis
    C. In-Memory analysis
    D. Pivot tables

16. _____ are typically used to support senior management with unstructured decisions.
    A. Transaction Processing Systems
    B. Management Information Systems
    C. Decision Support Systems
    D. Executive Support Systems

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17. In _____, strategies are translated into operational targets, and a set of key performance indicators are used to measure progress.
    A. Balance Scorecard Framework
    B. Business Performance Management
    C. Business Process Reengineering
    D. Total Quality Management

18. _____ provide the tools for the management, delivery, tracking, and assessment of employee learning and training.
    A. Enterprise Content Management Systems
    B. Knowledge Network Systems
    C. Learning Management Systems
    D. Knowledge Work System

19. _____ are rule-based technology that represents imprecision in categories (e.g., "cold" versus "cool") by creating rules that use approximate or subjective values.
    A. Case-Based Reasoning
    B. Fuzzy Logic
    C. Neural Networks
    D. Genetic Algorithms

20. Why are genetic algorithms useful in solving complex problems?
    A. Genetic algorithms provide the solutions to problems requiring expertise that is difficult to represent in the form of IF-THEN rules
    B. Genetic algorithms use hardware and software that parallel the processing patterns of a biological brain.
    C. Genetic algorithms work in the background without direct human intervention to carry out specific, repetitive, and predictable tasks for user, business process, or software application.
    D. Genetic algorithms find the optimal solution for a specific problem by examining very large number of alternative solutions for that problem.

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Section B: Short Questions (60 marks)

QUESTION 1

i. Demonstrate how information systems will influence accounting, finance, marketing and operations management. (12 marks)

ii. Elaborate **FIVE (5)** applications of a social business. (10 marks)

iii. Illustrate **FOUR (4)** applications of system configuration strategies in a global market by using a diagram. (8 marks)

(Total: 30 marks)

QUESTION 2

i. Define BYOD. Discuss any **TWO (2)** advantages and **TWO (2)** disadvantages of BYOD. (10 marks)

ii. Data mining and Online Analytical Processing (OLAP) are the tools used for managing and analysing big data. Explain how data mining differs from OLAP? Describe any **FOUR (4)** types of information can be obtained from data mining? (10 marks)

iii. Describe the characteristics and capabilities of the following wireless networking technologies in order to provide value to businesses:
a) Third-generation (3G) networks (2 marks)
b) Fourth-generation (4G) networks (2 marks)
c) Bluetooth (2 marks)
d) Wi-Fi (2 marks)
e) WiMAX (2 marks)

(Total: 30 marks)

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QUESTION 3

You work in a company that publishes novels. Recently, the management is proposing to produce these novels in softcopy format (e-book) as a way to expand the company's business opportunity. As a member of the management team, you are tasked to analyse and investigate this proposal.

i. You concluded that this proposal may further challenges the company's intellectual property rights when the physical books are converted into e-books for sale online. Justify your thoughts on your findings. (10 marks)

ii. As servers and databases are needed to sell and deliver electronic books to customer, you feel that there is a need to understand the security challenges and vulnerabilities of the company servers and databases. You are to brief the management about this. Identify and briefly explain five security challenges and vulnerabilities that can cause the disruptions of the company servers and databases. (10 marks)

(Total: 20 marks)

End of Paper